STATE BUILDING CODE INTERPRETATION NO. I-11-00

February 29, 2000

The following is offered in response to your letter in which you request an official interpretation of the requirement for secondary containment of home heating fuel oil tanks installed in connection with one- or two-family residences and how those requirements may or may not impact a local ordinance. In view of the fact that the 1999 State Building Code cannot be applied retroactively to tanks that legally exist, I will confine my answers to the requirements for newly installed tanks.

Please note that in most instances, no municipality may institute an ordinance that has requirements that differ from the State Building Code. However, section 29-316 of the Connecticut General Statutes gives local municipalities the power to enact ordinances that regulate the installation of fuel oil burners, associated equipment and fuel oil storage tanks. In view of this statute, any ordinance passed by a municipality that regulates the installation of residential fuel oil storage tanks would not have to match the requirements of the State Building Code.

First, let me explain that in Connecticut under the 1999 State Building Code, a one- or two-family residence may be constructed either as Use Group R-3 utilizing the BOCA National Building Code/1996 which references the 1996 International Mechanical Code; or as Use Group R-4 utilizing the 1995 CABO One and Two Family Dwelling Code. I will answer your questions based on both codes since you seek generic answers rather than for a specific building.

Question 1: What are the requirements of the 1999 State Building Code for secondary containment when installing a new residential home heating fuel oil storage tank aboveground at a one- or two-family residence?

Answer 1: For Use Group R-3, Section 2801.2 of the BOCA code refers the code user to the 1996 International Mechanical Code (IMC) for the installation of mechanical equipment. Section 1401.2.1 of the IMC states that the maximum amount of fuel oil storage allowed to be outside without additional protection shall be 660 gallons. For above ground storage of amounts greater than 660 gallons, the code user is referred to the State Fire Safety Code. I have determined, through consultation with representatives of the State Fire Marshal's Office, that the State Fire Safety Code, through the Oil Burning Equipment Code, references the NFPA 31-1992 Standard.

Section 2-6 of the NFPA 31 standard deals with the installation of outside aboveground tanks larger than 660 gallons. Section 2-6.5 requires the control of spillage from aboveground tanks larger than 660 gallons by either remote impounding which is the creating of an impounding area with a capacity not less than that of the largest tank that can drain into it, or; by the impounding around the tanks by creation of a dike or berm surrounding an area that will accommodate the volume of the largest tank within the diked or bermed area. Therefore, for Use Group R-3, a secondary containment area for aboveground fuel oil storage tanks is only required when tank capacity exceeds 660 gallons.

For use Group R-4, Section 2701.2 of the CABO code states that the maximum amount of fuel oil stored aboveground shall be 660 gallons, with no mention of any requirement for secondary containment.

Question 2: What are the requirements of the 1999 State Building Code for secondary containment when installing a new residential home heating fuel oil storage tank in the basement of a one- or two-family residence?

Answer 2: For Use Group R-3, Section 2801.2 of the BOCA code refers the code user to the 1996 International Mechanical Code (IMC) for the installation of mechanical equipment. Section 1401.2.2 of the IMC states that the maximum amount of fuel oil that can be stored inside a building is 660 gallons and refers the code user back to the BOCA code for any fuel oil storage in excess of 660 gallons inside a building. The BOCA code requires that any storage of fuel oil in excess of 660 gallons inside a building be treated as Use Group H-3, requiring a three-hour fire separation between the H-3 and the R-3 use groups, something that is highly unlikely to occur in a one-or two-family residence due to the costs involved. At any rate, there is no requirement under Use Group R-3 to provide secondary containment for fuel oil storage in the basement, regardless of the amount of fuel oil stored inside the building.

For Use Group R-4, Section 2701.2 of the CABO code states that the maximum amount of fuel oil stored inside of a building shall be 660 gallons with no mention of any requirement for secondary containment.

Question 3: Does a municipal Building Code Board of Appeals have jurisdiction to hear appeals of the local building official's interpretation of a local ordinance?

Answer 3: No, not under the auspices of the State Building Code. Section 121.1 of the BOCA National Building Code/1996 and Section 107.1 of the 1995 CABO One and Two

Family Dwelling Code provide information regarding the two instances when a municipal board of appeals may hear an appeal of a decision of a local code official.

The first of these circumstances is when the local official rejects or refuses to approve the mode or manner of construction proposed to be followed or the materials to be used in the erection or alteration of a building or structure, or when it is claimed that the provisions of the code do not apply or that an equally good or more desirable form of construction can be employed in a specific case, or when it is claimed that the true intent and meaning of the code has been misconstrued or wrongly interpreted, and the permit has been refused in whole or in part (emphasis added). It is important to note that the first circumstance noted is only applicable to the State Building Code and only if a permit has been refused in whole or in part. Any issue involving a local building official's interpretation of the State Building Code that arises after the issuance of the permit may not be brought to the municipal board of appeals.

The second circumstance involves the appeal of a written order by a local building official concerning occupational licensure of persons at a construction site for which a permit has been issued.

The State Building Code does not provide for a municipal board of building appeals to be a mechanism for appeal of a local building official's interpretation of a local ordinance. Another board would have to be designated as the appeals body through the appropriate legal channels set up in the municipality.